

Application No.: 10/798,886

**AMENDMENT TO CLAIMS**

1. (Currently amended) A component of a crank mechanism, incorporated in the crank mechanism that converts reciprocating motion of a piston to rotary motion by means of a crank pin, a crank arm and a crank shaft via a connecting bar, wherein said component has a hydrogen content of no more than 0.5 ppm, wherein the component has a nitriding layer formed by a carbonitriding process.

2. (Currently amended) A component of a crank mechanism, incorporated in the crank mechanism that converts reciprocating motion of a piston to rotary motion by means of a crank pin, a crank arm and a crank shaft via a connecting bar, wherein said component contains austenite grains having a grain size number exceeding 10, and wherein the component has a nitriding layer formed by a carbonitriding process.

3. (Currently amended) A component of a crank mechanism, incorporated in the crank mechanism that converts reciprocating motion of a piston to rotary motion by means of a crank pin, a crank arm and a crank shaft via a connecting bar, wherein said component has a fracture stress value of no less than 2650 MPa, wherein the component has a nitriding layer formed by a carbonitriding process.

4. (Currently amended) A support structure in a crank mechanism that converts reciprocating motion of a piston to rotary motion by means of a crank pin, a crank arm and a crank shaft via a connecting bar, the support structure having a plurality of bearings arranged therein, each said bearing including an inner member, an outer member and a plurality of rolling

**Application No.: 10/798,886**

elements, wherein in at least one of said bearings, at least one of said inner and outer members and said rolling elements has a hydrogen content of no more than 0.5 ppm, wherein at least one of the inner and outer members and the rolling elements has a nitriding layer formed by a carbonitriding process.

5. (Original) The support structure in a crank mechanism according to claim 4, wherein at least one of said bearings arranged in said support structure is a bearing that is located at an end portion of said crank shaft to rotatably support said crank shaft.

6. (Currently amended) A support structure in a crank mechanism that converts reciprocating motion of a piston to rotary motion by means of a crank pin, a crank arm and a crank shaft via a connecting bar, the support structure having a plurality of bearings arranged therein, each said bearing including an inner member, an outer member and a plurality of rolling elements, wherein in at least one of said bearings, at least one of said inner and outer members and said rolling elements contains austenite grains having a grain size number exceeding 10, wherein at least one of the inner and outer members and the rolling elements has a nitriding layer formed by a carbonitriding process.

7. (Original) The support structure in a crank mechanism according to claim 6, wherein at least one of said bearings arranged in said support structure is a bearing that is located at an end portion of said crank shaft to rotatably support said crank shaft.

**Application No.: 10/798,886**

8. (Currently amended) A support structure in a crank mechanism that converts reciprocating motion of a piston to rotary motion by means of a crank pin, a crank arm and a crank shaft via a connecting bar, the support structure having a plurality of bearings arranged therein, each said bearing including an inner member, an outer member and a plurality of rolling elements, wherein in at least one of said bearings, at least one of said inner and outer members and said rolling elements has a fracture stress value of no less than 2650 MPa, wherein at least one of the inner and outer members and the rolling elements has a nitriding layer formed by a carbonitriding process.

9. (Original) The support structure in a crank mechanism according to claim 8, wherein at least one of said bearings arranged in said support structure is a bearing that is located at an end portion of said crank shaft to rotatably support said crank shaft.